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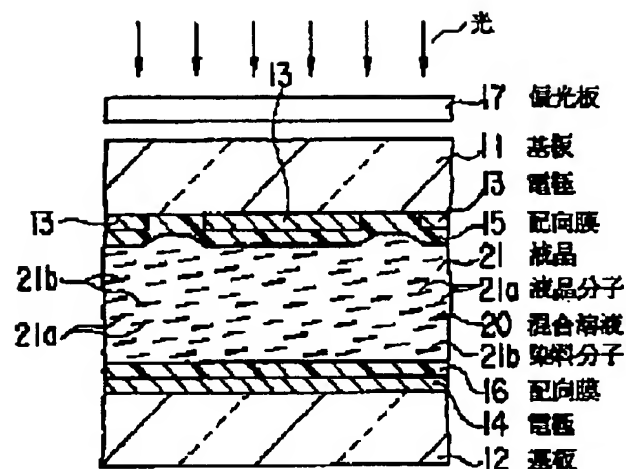
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APPLICANT : CASIO COMPUT CO LTD;

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INT.CL. : G02F 1/1333 G02F 1/1335 G02F 1/137

TITLE : PRODUCTION OF POLYMER  
DISPERSION TYPE LIQUID CRYSTAL  
ELEMENT



ABSTRACT : PURPOSE: To form a liquid crystal/polymer combined film having good light scatterability without increasing the quantity of the light to be cast on a soln. mixture by efficiently utilizing the light to be cast on the soln. mixture for photopolymerization of a polymer material.

CONSTITUTION: The liquid crystal/polymer combined film is formed by forming layer of a soln. mixture 20 composed of a polymer material to be brought into polymerization reaction by light and a liquid crystal containing a dichromatic dye between substrates 11 and 12 and irradiating the soln. mixture 20 with light in the state of nearly uniformly orienting the molecules 21b of the dichromatic dye in a prescribed direction via a polarizing plate 17 under conditions under which the angle  $\psi$  formed by the direction orthogonal with the absorption axis of the major axis direction of the molecules of the dichromatic dye and the polarization direction of the linearly polarized light transmitted through the polarizing plate 17 and the transmittance  $\chi$  of the polarizing plate 17 satisfy  $\chi \geq (\pi/2) \sin \psi$  and  $\chi \geq [\pi/(\pi+2)] (\sin \psi + \cos \psi)$ , thereby photopolymerizing the polymer material.

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